

# United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/684,173	10/06/2000	James R. Kittrell	00-625	3692
7590 04/25/2006		EXAMINER		
Gregory P. LaPointe Bachman & LaPointe, P.C. 900 Chapel Street, Suite 1201 New Haven, CT 06510-2802			TRAN, THAO T	
			ART UNIT	PAPER NUMBER
			1711	
		DATE MAILED: 04/25/2006		

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)			
Office Action Summary		09/684,173	KITTRELL, JAMES R.			
		Examiner	Art Unit			
		Thao T. Tran	1711			
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1)🖂	Responsive to communication(s) filed on <u>06 Ma</u>	arch 2006.				
· · · —		action is non-final.				
3)□						
·	closed in accordance with the practice under E	x parte Quayle, 1935 C.D. 11, 45	33 O.G. 213.			
Dispositi	on of Claims					
4)🖂	Claim(s) 27 and 28 is/are pending in the applic	ation.				
	4a) Of the above claim(s) is/are withdrawn from consideration.					
5)	Claim(s) is/are allowed.	•				
6)⊠	6)⊠ Claim(s) 27-28 is/are rejected.					
7) 🗌	Claim(s) is/are objected to.					
8)□	Claim(s) are subject to restriction and/or	r election requirement.				
Applicati	on Papers					
9)[	The specification is objected to by the Examine	r.				
10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.						
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).					
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.						
Priority u	ınder 35 U.S.C. § 119					
	Acknowledgment is made of a claim for foreign  All b) Some * c) None of:  1. Certified copies of the priority documents  2. Certified copies of the priority documents  3. Copies of the certified copies of the priority documents  application from the International Bureau	s have been received. s have been received in Applicati rity documents have been receive	on No			
Attachment  1) Notic  2) Notic  3) Inforr	t(s) e of References Cited (PTO-892) e of Draftsperson's Patent Drawing Review (PTO-948) nation Disclosure Statement(s) (PTO-1449 or PTO/SB/08) r No(s)/Mail Date	4) ☐ Interview Summary Paper No(s)/Mail Da	(PTO-413)			

#### **DETAILED ACTION**

## Response to Amendment

- 1. This is in response to the Amendments filed on 03/06/2006. The Affidavits filed on 3/06/2006 are also acknowledged.
- 2. Claims 27-28 are currently pending in this application. Claims 27-28 have been amended.
- 3. Due to the Affidavits filed on 3/06/2006, the 102(e) rejections of claims 27-28 in the Office action of 11/09/2005 as being anticipated by Kittrell '951 and Kittrell '971 have been withdrawn.
- 4. The 103(a) rejection of claims 27-28 as being unpatentable over Kramer '749 in the prior Office action is maintained as follows.

#### Claim Rejections - 35 USC § 103

- 5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 6. Claims 27-28 are rejected under 35 U.S.C. 103(a) as obvious over Kramer et al. (US Pat. 6,086,749).

Kramer teaches a catalyst composite, comprising an inorganic support with a deposit of one or more metals in the support. The inorganic support can be a mixture of silica and titania, whereas the metals can be tungsten oxide and platinum (see col. 37, ln. 2-20). Kramer further teaches tungsten oxide (Group VIB metal) to be about 0.5 to about 50% by weight, preferably

Application/Control Number: 09/684,173

Art Unit: 1711

about 0.5 to about 30% by weight; platinum (Group VIII metal) about 0.1 to about 10% by weight; and that the total metal components would be about 0.1 to about 60% by weight of the total catalyst (see col. 37, ln. 32-51), overlapping the instantly claimed ranges. Thus, the total weight of silica and titania would be about 40 to about 99.9%, overlapping the instantly claimed ranges.

Although Kramer is silent with respect to the weight percent of silica and titania separately, the weight percent of silica and titania each would be overlapping the instantly claimed ranges, because the silica weight is presently claimed to be about 0.1% to about 70% whereas the titania weight about 30% to about 90%.

Kramer, however, does not specify the individual weight percent of titania or silica.

Therefore, it would have been obvious to one of ordinary skill in the art, at the time the invention was made, to have determined the weight percent of silica and titania needed to provide the properties desired in the catalyst.

## Response to Arguments

7. Applicant's arguments filed 3/06/2006 with respect to the rejection of claims 27-28, under 35 U.S.C. 103(a) as unpatentable over Kramer '749 have been fully considered but they are not persuasive. The Affidavit filed on 3/06/2006 has also been considered, but not found persuasive.

The Affidavit provides two catalysts to illustrate the difference in catalytic activity of the catalysts having 0.2 weight % (catalyst 1) and 0 weight % (catalyst 2) of silica. However, catalyst 1 is specific to an amount of 0.2% silica and not commensurate with the scope of the claims, whose range is from about 0.1 t about 70%. Applicant contends that the Kramer

reference does not require silica in any of their catalyst compositions. However, as pointed out in the prior Office actions, Kramer does disclose the use of an inorganic support containing a mixture of silica and titania.

Applicant further contends that the catalyst of Kramer is a catalyst used in high temperature hydroprocessing of hydrocarbon feedstocks to upgrade to a more useful product. Applicant further argues that since the catalyst of Kramer is not for purifying contaminated gas streams, it would not be obvious to select the composition of the catalyst as claimed in a hydroprocessing method as taught by Kramer. However, as pointed out above and in the prior Office actions, since the catalyst of Kramer comprises all of the components recited in the presently claimed invention, the catalyst of Kramer would have inherently been able to perform all the functions as presently claimed.

Furthermore, as shown in Kramer, the catalyst used in hydroprocessing is to remove undesirable components from the hydrocarbon feed streams (see col. 1, ln. 33-34). Thus, the catalyst of Kramer is to purify the contaminated hydrocarbon streams. Applicant is further reminded that intended use would have no significant patentable weight in a product claim.

## Conclusion

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO

Application/Control Number: 09/684,173

Art Unit: 1711

MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Page 5

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thao T. Tran whose telephone number is 571-272-1080. The examiner can normally be reached on Monday-Friday, from 9:00 a.m. - 5:30 p.m.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James Seidleck can be reached on 571-272-1078. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

tt April 21, 2006

THAOT.TRAN
PATENT EXAMINER

Theo lon